

PATENT

AMENDMENTS TO THE CLAIMS

Please amend the claims as indicated in the following listing of all claims:

1. – 13. (Cancelled)

14. (Previously Presented) A networked system comprising:
a sending node;
a plurality of receiving nodes coupled to receive multicast information sent from the sending node during a multicast operation and coupled to provide acknowledgements indicating whether the multicast information was successfully received; and
a switching medium coupled to supply the multicast information to the respective receiving nodes and to receive and combine the respective acknowledgements into a combined acknowledgement that indicates which of the plurality of receiving nodes acknowledged receipt of the multicast information, wherein the merged acknowledgement is supplied to the sending node, wherein each acknowledgement comprises a plurality of bits, each bit corresponding to a different node, one bit being set to indicate that a node corresponding to the one bit successfully received the multicast information.

15. (Original) The networked system as recited in claim 14 wherein the combined acknowledgement includes a plurality of bits corresponding to multicast targets, each bit of the combined acknowledgement that is set corresponding to a node that successfully received the multicast information.

16. (Previously Presented) A networked system comprising:
a sending node;
a plurality of receiving nodes coupled to receive multicast information sent from the sending node during a multicast operation and coupled to provide acknowledgements indicating whether the multicast information was successfully received; and

PATENT

a switching medium coupled to supply the multicast information to the respective receiving nodes and to receive and combine the respective acknowledgements into a combined acknowledgement that indicates which of the plurality of receiving nodes acknowledged receipt of the multicast information, wherein the merged acknowledgement is supplied to the sending node, wherein each acknowledgement comprises a plurality of bits, each bit corresponding to one of a plurality of types of errors.

17. (Original) The networked system as recited in claim 16 wherein corresponding bits from respective ones of the acknowledgements are combined in the combined acknowledgement, a bit being set to a first predetermined value in the combined acknowledgement to indicate that one or more of the targets had a particular one of the errors and the bit being set to a second value to indicate that none of the receiving nodes had the particular one of the errors.

18. – 23. (Cancelled)

24. (Previously Presented) A networked system comprising:
a sending node;
a plurality of receiving nodes coupled to receive multicast information sent from the sending node during a multicast operation and coupled to provide acknowledgements indicating whether the multicast information was successfully received; and
a switching medium coupled to supply the multicast information to the respective receiving nodes and to receive and combine the respective acknowledgements into a combined acknowledgement that indicates which of the plurality of receiving nodes acknowledged receipt of the multicast information, wherein the merged acknowledgement is supplied to the sending node, wherein the networked system is operable to reserve switch paths for forwarding the acknowledgements based on switch settings used for forwarding the multicast information.

PATENT

25. – 31. (Cancelled)

32. (Previously Presented) A network node comprising:
a plurality of ports to receive and to transmit multicast information;
multicast acknowledgement merging logic coupled with the plurality of ports, the logic to
generate a merged multicast acknowledgement that indicates acknowledging
target nodes of a multicast, the multicast acknowledgement merging logic to
merge multicast acknowledgements to indicate whether a multicast was
successful, and the multicast acknowledgement merging logic to set a forwarding
mask that indicates those of the plurality of ports that correspond to multicast
target nodes.

33. (Previously Presented) The network node of claim 32, wherein the multicast
acknowledgement merging logic includes inverters to invert indications of acknowledging
multicast target nodes, AND gates to logically AND the inverted indications with the forwarding
mask, and a NOR gate to logically combine output of the AND gates.

34. (New) The networked system as recited in claim 14 wherein the networked
system includes a switched data network and the switching medium is a network switch.

35. (New) The networked system as recited in claim 14 wherein the
acknowledgements from the plurality of target nodes are provided to the switching medium at a
fixed time relative to the sending of the multicast information.

36. (New) The networked system as recited in claim 35 wherein the combined
acknowledgement is provided to the source node at a fixed time relative to the sending of the
multicast information.

37. (New) The networked system of claim 14, wherein the networked system is
pipelined.

OK to
enter
TP
8/29/05

PATENT

38. (New) The networked system as recited in claim 14, wherein the switching medium combines the acknowledgements in response to information in each acknowledgement packet that indicates a multicast acknowledge is being sent.

39. (New) The networked system as recited in claim 14, wherein the switching medium combines the acknowledgements into the combined acknowledgement if the acknowledgements arrive at the same time in the switching medium and are destined for a same source.

40. (New) The networked system as recited in claim 14, wherein the switching medium combines the acknowledgements in response to having scheduled a multicast data transfer.

41. (New) The networked system as recited in claim 14 wherein the networked system includes a plurality of hosts, each of the hosts including both a sending node and a receiving node coupled to the switching medium.

42. (New) The network node of claim 32, wherein the network node includes one or more of a router, switch, and a bridge.

43. (New) The network node of claim 32, wherein indication of the acknowledging target nodes comprises indicating those of the plurality of ports that correspond to acknowledging target nodes.

44. (New) The network node of claim 32, wherein indication of the acknowledging target nodes comprises identifying the acknowledging target nodes.

OK to
enter
TP
8/29/05